

**Abstract**

Described is an optical unit (1), having a sensor device in particular, including a housing (5) enclosing same, a radiation-sensitive sensor surface (11), designed for detecting electromagnetic radiation from a frequency section, having a predefined width and position, of the spectral range including the near infrared range (NIR) and/or the visible range (VIS range), and a lens system (3, 9). In order to reduce the cost and complexity for mounting a lens on the housing (5) and to obtain a uniform housing surface on the object side, a part (3) of the lens system (3, 9) acting as a lens on the object side or the entire lens system (3) of the unit (1) is designed as an integral component of the housing (5) of the unit (1).

(Fig. 1)